

At page 3 change the first line to read as follows:

B2
Fig. 2 is a graph of power transmitted vs. fiber position for prior art apparatus;

On page 3, change line 6 to read as follows:

B3
Fig. 4 is a graph of refractive index variation with distance from the launch end of a fiber in accordance with the principles of this invention.

At page 3, change line 9 to read as follows:

B4
Fig. 6 is a block diagram of a system using the fiber of Figs. 1 and 3.

At page 3, change line 10 to read as follows:

B5
Fig. 7 is a block diagram of a further system using the fiber of Figs. 1 and 3.

At page 4, beginning at line 1, change to read as follows:

B6
where P_0 is the power at the input end of the fiber, P is the power at a distance l from the input end, a is the core radius, α is the absorption coefficient of the cladding, n_{co} and n_{cla} are the core and cladding refractive indices, N is a common mathematical designation for the number of segments used for the calculation; it represents the number of positions to which the calculation is applied, and η_i is the fraction of the power carried by core guided modes.

At page 7 please enter the following change:

B7
An optical fiber having a core of F-2 Schott glass with a diameter of 100 micrometers and a cladding of polymer with a thickness of 20 micrometers was fabricated and a twenty meter length of the fiber was tested at 850nm (active wavelength) as a moisture sensor. A reference wavelength of 1300 nm also was used. A dry